SUMMARY OF THE PROFICIENCY TESTING COMMITTEE MEETING NOVEMBER 1, 2000

The Proficiency Testing (PT) Committee of the National Environmental Laboratory Accreditation Conference (NELAC) met on Wednesday, November 1, 2000, at 1:30 p.m. Pacific Daylight Time (PST) as part of the Sixth NELAC Interim Meeting (NELAC 6i) in Las Vegas, NV. The meeting was led by its chair, Ms. Barbara Burmeister of the Wisconsin State Laboratory of Hygiene. A list of action items is given in Attachment A. A list of participants is given in Attachment B. *The purpose of the meeting was to review comments and progress made by the PT Subcommittee on Implementation and Standardization and to discuss method codes and PT Field of Testing.*

INTRODUCTION

Ms. Burmeister welcomed participants to the meeting and asked committee members to introduce themselves. Following introductions, she asked that those interested in committee membership fill out a nomination form and either give it to her or turn it in at the NELAC registration desk. She then reviewed the ground rules and the agenda for the meeting.

CHAPTER 2 COMMENT SUMMARY

Ms. Cindy Nettrour reviewed the comments received since the last interim meeting. She said that with respect to these comments, the committee did not propose any changes to the NELAC Standard at this time. She then asked participants if there were any further comments about these issues.

With respect to the one-year time frame for accrediting authorities to implement changes, comment was received that manufacturers also need time to implement changes (at least two months). Another participant agreed that PT providers need time to review the changes to the standard and to reach compliance. Comment was made that the time-frame for implementation should be the same for all stakeholders.

PROFICIENCY TESTING SUBCOMMITTEE ON IMPLEMENTATION AND STANDARDIZATION

Mr. Larry Jackson provided a general overview of the subcommittee's task. Minutes from the subcommittee meeting on September 19-20, 2000, were distributed to participants (the minutes are also posted on the NELAC Website). He said that the participants comments from the Sixth NELAC Annual Meeting (NELAC 6) have been heard. Mr. Jackson said that these are issues of significant complexity and were addressed by the formation of three working groups. He asked for written comments to help the committee determine the right words to include in the NELAC Standard. Ms. Burmeister said that the cut-off date for comments is January 19, 2001. She asked that comments be submitted by that date to make sure the committee has time to discuss them.

Data Reporting Working Group Report

Mr. Matt Caruso reviewed the report from the Data Reporting Working Group. He then received comments from the audience.

A participant stated that the main issue is the inconsistency in how to handle non-detects. Mr. Caruso said there is language in the U.S. Environmental Protection Agency (EPA) externalization program on how to handle this and the committee is currently investigating this.

Another participant said that the accrediting authorities sometimes have problems when provided with multiple method data for the same analytes. A recommendation was made that laboratories tell their PT provider which methods need to be reported and submitted to the accrediting authority. This way the accrediting authority is not in a bind trying to figure out PT compliance status for multiple method data.

Another participant stated that, in addition to water, guidance is needed on how to handle non-detects for solid waste. He asked that the PT Committee try to extend any proposed language beyond the Water Supply (WS) and Water Pollution (WP) programs.

There was some discussion on how null, or blank, results are interpreted. A participant said that he thought if someone reported nothing (blank), then it was interpreted as nonexistent data and would not be reported by the PT provider. Another participant stated that a PT supplier told them to leave results blank, because the date analyzed, reported beside each analyte, would indicate that the analyte was analyzed for. Mr. Caruso responded that most of the PT suppliers do not include date analyzed beside each analyte; it is usually indicated only once on the report. A representative from an accrediting authority added that if an analyte is omitted from the report, sometimes the accrediting authority has difficulty determining whether the analyte was actually included in the mix. Several participants stated that they wanted to keep "Not Reported" on the reports as an indicator that the result was not received.

A participant stated that he is getting the impression that "not reported" means "wrong." He wanted to make sure that "not reported" is not being counted against the laboratory. Another participant offered a couple of recommendations. First, he recommended that the PT Committee post a clarification memo on the NELAC Website clearly stating how the "Not Reported" and "ND" (not detected) data is handled. Second, the committee should make a recommendation to the accrediting authorities that they find a way to allow revised reports to be accepted, in case laboratories have been penalized for the wrong reason.

The committee intends to prepare a Frequently Asked Question (FAQ) for the ways a laboratory can report non-detects to PT providers and the way the result is scored by providers and reported to the AAs.

"Quick Response"/Corrective Action Working Group Report

Mr. Anand Mudambi reviewed the report from the "Quick Response"/Corrective Action Working Group. A copy of this report was distributed to participants and is included in Attachment C.

One participant stated that he thought this type of study is really needed. Another participant brought up the case of additional fields of testing. He said that if a laboratory has already achieved NELAC accreditation, but needs to add just one more analyte to list, the laboratory should not need to immediately perform a PT. He said that the analyte would be included in the next round of PTs.

The working group is preparing draft language to address the use of corrective action PT samples and will submit the language to the PT Committee.

Report Format Working Group Report

Ms. Marykay Steinman reviewed the report from the Report Format Working Group. This report was also distributed to participants and is included as Attachment D.

Ms. Steinman said that the proposed language is intended for clarification only. Because the EPA Criteria Document has been difficult to obtain, the working group decided that it would be helpful to include the language directly in the NELAC standards (Section 2.6 and Appendix B.5).
A participant questioned the meaning of "date of re-evaluation" (Item 2). Ms. Steinman said that this is supposed to mean "date of corrected report" and will make this change in the wording. Another participant stated that sometimes it is difficult to determine what revisions have been made in corrected reports. She requested that some indication of the revisions be required.

A participant stated that the proposed change to Appendix B.5 would limit the accrediting authorities. He said that it is the accrediting authorities' job to decide what it needs, not the committee's or the PT provider's. Another participant said that he would like to see the accrediting authorities get together to decide on a uniform format, rather than putting it on the PT providers.

Regarding Item 9, a participant said that "lot number" means something very specific in their business and asked the committee to change this to a more general term (e.g., sample ID).

Comment was that some of these proposed changes are not really required in the EPA Criteria Document – they are merely suggested. The participant suggested that the committee coordinate with EPA on these requirements.

Another participant suggested that the committee check with the National Institute of Standards and Technology (NIST) before including "NIST" in Item 4. Another participant suggested removing "NIST" altogether from the sentence, and simply leave it as "accreditation number."

A participant asked about "analyte number" in Item 8. A committee member responded that this is the NELAC analyte number. NELAC analyte numbers are available in the PT Field of Testing tables that are currently posted on the NELAC Website.

A participant questioned the requirement in Item 11 for reporting three significant figures. She said that the number of significant figures should vary according to the method used. Ms. Steinman said that the requirement came from the EPA Criteria Document and was not sure how to explain it further.

Lastly, a participant stated that the committee needs to differentiate between study "close date" and "date reported" because PT results may be requested by another accrediting authority at a later date.

METHOD CODE STANDARDIZATION UPDATE

Mr. Ralph Obenauf provided some background on the committee's efforts. He said that the committee needs to consider where the Program Policy and Structure Committee is going with their models for Scope of Accreditation. The committee will develop a list of method codes and present them at the Seventh NELAC Annual Meeting which is scheduled for May 2001.

Dr. Ken Jackson asked whether the same method code would be used for "comparable" methods and suggested that the committee be careful with that. Dr. Jackson added that the Program Policy and Structure Committee can provide a list of "equivalent" methods. The PT Committee said that they are not sure right now, but will consider it.

Another participant said that he did not think method codes should be associated with PTs. The committee responded that method codes are required by the EPA database right now and that standardized codes are needed to ensure consistency.

A participant said that the laboratories are looking for guidance on what codes to use. Any codes are fine, but the list needs to be uniform, and it is needed quickly. Another participant said that she would like a standardized list as soon as possible.

A participant asked what the committee proposes to do with method modifications. The committee has no proposal for this yet. Another participant said that Performance Based Measurement Systems (PBMS) will require some kind of central clearinghouse to register unique technologies and assign method codes. A participant stated that "matrix" definitions and "technology" definitions are very different for Chapter 1 and Chapter 2. He reminded the committee and participants that PTs are only one part of NELAC accreditation.

DISCUSSION OF PT FIELD OF TESTING

Ms. RaeAnn Haynes led the discussion on PT Field of Testing. She reviewed some of the questions that the PT Committee would like feedback on.

1. Is the current system of "program-matrix-analyte" working? Why or why not?
2. Should the PT Field of Testing match the Scope of Accreditation?
3. Since Chapter 1 is contemplating changing the Scope of Accreditation (e.g., "matrix-method-analyte/analyte group," "technology-matrix-analyte/analyte group") should the PT Field of Testing include analyte group?
4. Who determines analyte groups and should they be limited to organics?
5. Should there be representative analytes in each group?
6. What should the passing criteria be?
7. What happens if a representative analyte is failed?

Several participants stated that they wanted analyte groups and agreed that they also liked the "80% rule" for passing PTs. One participant noted that the accrediting authority has the authority to re-inspect the laboratory if they see a problem. If the same analyte is failed multiple times, it should be the decision of the accrediting authority on what to do.

A participant said that a possible solution would be to allow laboratories to analyze PTs by group (e.g., volatile organic compounds) and if they do not wish to be accredited for the entire group, then let them request a PT sample for the subset (e.g., BTEX). Also, if the laboratory fails one of the analytes, then let them rerun a PT specifically for that one analyte. A representative for a PT provider said that there would need to be a way to differentiate whether the laboratory was requesting PTs for a group of analytes, or for individual analytes.

A participant said that the PT list will always differ from the scope of accreditation. The participant said that there does not need to be a one-to-one correspondence. He did think there needed to be analyte groups with representative analytes.

Dr. Ken Jackson said that there is little consistency among accrediting authorities as to what constitutes an analyte group. He said that it might make more sense for the PT Committee to establish a list of analytes in each analyte group. Otherwise, it will be up to the Program Policy and Structure Committee to determine analyte groups. He agreed with the previous comment in that the PT Field of Testing do not need to be directly linked to the Scope of Accreditation.

A participant from EPA said that analyte groups would accommodate whether accrediting by method or by technology. He said the committee should consider adding concentration range to the PT field of testing. A laboratory may need to run multiple PT samples (for different groups) in order to cover all the analytes they want to be accredited for. Another participant representing a PT provider, said that it really does not matter what method is used to achieve the results; all that matters is that the laboratory can measure correctly, within a certain degree of uncertainty.

A PT provider requested that if the committee decides to use analyte groups, then they should consider the "60-40 rule" for the PT sample analyte mix and suggested working with EPA to determine whether

this is a statistically reasonable number. Also, when considering the "80% rule" for scoring an analyte group, he asked that the committee examine whether there is enough supporting information for this.

A participant said that he would like to see "program" removed from the PT Field of Testing. A state representative said that although they can do without "program" their legislative government will never do away with "program" in their state system.

A participant said that their most likely problems are with dilutions and said that he sees this as a problem for the ranges that PT providers have to work with.

Ms. Haynes reviewed the comments she heard requested for the PT Field of Testing. She said that the only proposed change needed for the PT field of testing in the NELAC Standard is the addition of analyte groups. She heard that the PT Field of Testing does not need to match Scope of Accreditation. Also, the scoring criteria of 80% is only needed for organic analyte groups. She took a straw poll to see how many people would like to see "program" removed from the current PT Field of Testing. About one half of the participants indicated that they supported this.

MISCELLANEOUS

Ms. Burmeister asked if there were any other items which needed to be discussed. A participant said that he would like a FAQ on how to meet the requirements for drinking water and NELAC (e.g., whether methods could be alternated). Ms. Burmeister said that the committee did write a FAQ, but is not sure whether or not it has been posted.

Attachment A

ACTION ITEMS
PROFICIENCY TESTING COMMITTEE MEETING
NOVEMBER 1, 2000

Item No.	Action	Date to be Completed
1.	Write a FAQ for how laboratories report non-detected analytes to PT providers and PT providers to the AAs.	12/15/00
2.	Propose language to allow limited use of PT samples for corrective action purposes.	3/19/01
3.	Propose language for uniform reporting format.	3/19/01
4.	Evaluate the current PT Field of Testing for a potential change.	3/19/01
5.	Develop standardized method codes.	5/22/01

Attachment B

PARTICIPANTS
PROFICIENCY TESTING COMMITTEE MEETING
NOVEMBER 1, 2000

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Attachment C

"QUICK RESPONSE"/CORRECTIVE ACTION WORKING GROUP REPORT

NELAC 6i

Proficiency Testing Committee Session

1st November 2000

Proficiency Testing (PT) Subcommittee Meeting on Implementation and Standardization:

This Subcommittee met at the USEPA Science Center in Fort Meade, MD on September 19-20, 2000. The Working Group for Quick Response/Corrective Action Studies was formed to address the concerns raised by laboratories if and when they experience a PT failure for analytes required for their continuing accreditation. Since their accreditation is based on passing individual analytes, they would like to quickly analyze a corrective action PT sample which could be analyzed right after knowing their specific analyte(s) failure.

As a result of discussions, the Working Group identified a number of issues that it needs to consider:

1. Definition of a corrective action PT study.

2. Differentiation of a corrective action PT study from a regular PT Study.

3. Use of previously released NELAC compliant PT studies for use in Corrective Action Studies (not currently allowed - see Section 2.3.3).

4. Other uses of Corrective Action PT Studies - e.g., adding fields of testing to an existing scope.

The Working Group is preparing draft language to address these issues which will be submitted to the PT Committee for discussion. The Committee is also interested in soliciting comments from affected parties, e.g., states, federal agencies, PT Providers and laboratories, on the need for and impact of Corrective Action PT studies for NELAC laboratories.

Attachment D

REPORT FORMAT WORKING GROUP REPORT

Proposed changes to Sections 2.6 and B.5 of the NELAC Standards for Proficiency Testing

Section 2.6 Evaluation of Proficiency Testing Results

Section 2.6 (fourth sentence) currently reads:

> The PT Provider shall provide the participant laboratories and the Primary Accrediting Authority a report showing at a minimum the laboratory's reported value, the assigned value, the acceptance range, the acceptable/not acceptable status, and the method for each analyte reported by the laboratory.

The following is the proposed change to replace the above sentence:

> The PT Provider shall provide the participant laboratories and the Primary Accrediting Authority a report showing at a minimum:
>
> 8. Study type and the date the study started and ended, in the header or cover page.
> 9. Date of re-evaluation, if applicable, in the header or cover page.
> 10. Study Number, in the header or cover page.
> 11. Provider name and NIST accreditation number, in the header or cover page.
> 12. Name and address (location) of the laboratory, in the header or cover page. This is not the address of the corporate headquarters, but the address of the actual laboratory completing the testing.
> 13. State ID or USEPA ID, if applicable, in the header or cover page.
> 14. Name, title, and telephone number of the laboratory official who has approved the data, in the header or cover page.
> 15. Analyte number and name for each analyte reported
> 16. Lot Number
> 17. Method Code and method description
> 18. Reported values, assigned values, and acceptance values, reported to three significant digits.
> 19. An indication of "Not Reported" when a parameter within a PT sample is left blank.

20. An indication of the length of report, presented by either Page # of Page # or the total number of pages with each page consecutively numbered.

21. Any additional parameters as listed in the USEPA Criteria Document, Criteria for Individual Laboratory Evaluation Report (Water Supply Program), Criteria for Individual Permittee Evaluation Report (Discharge Monitoring Report Quality Assurance Program), Criteria for Individual Laboratory Evaluation Report (Water Pollution Program).

B.5 Data Reporting by PT Providers

The current language in Section B.5 (last sentence) is as follows:

> Providers shall supply PT data to Primary Accrediting Authorities, as per Section 2.6, in a format acceptable to the Primary Accrediting Authority.

The following is the proposed change to replace the above sentence:

> Providers shall supply PT data to Primary Accrediting Authorities, as per Section 2.6, as well as making available electronic files in the format described in the USEPA Criteria Document.

The intent of the proposed changes was to produce a list of parameters, which if included in the PT reports would assist the laboratories and the Accrediting Authorities in interpreting the data.